

## Single relay - REL-MR-110DC/21-21 - 2961202

Please be informed that the data shown in this PDF Document is generated from our Online Catalog. Please find the complete data in the user's documentation. Our General Terms of Use for Downloads are valid (<http://phoenixcontact.com/download>)




Plug-in miniature power relay, with power contact, 2 PDTs, input voltage 110 V DC

### Your advantages

- ✓ RT III-proof (wash-proof)
- ✓ Switching current of up to 8 A
- ✓ RT III-proof (wash-proof)



### Key Commercial Data

Packing unit	1 pc
Minimum order quantity	10 pc
GTIN	 4 017918 158002
GTIN	4017918158002
Weight per Piece (excluding packing)	16.500 g
Custom tariff number	85364900
Country of origin	Austria

### Technical data

#### Dimensions

Width	12.7 mm
Height	29 mm
Depth	15.7 mm

#### Ambient conditions

Ambient temperature (operation)	-40 °C ... 85 °C
---------------------------------	------------------

# Single relay - REL-MR-110DC/21-21 - 2961202

## Technical data

### Ambient conditions

Ambient temperature (storage/transport)	-40 °C ... 85 °C
Degree of protection	RT III (wash-proof)

### Coil side

Nominal input voltage $U_N$	110 V DC
Typical input current at $U_N$	4.1 mA
Typical response time	7 ms
Typical release time	3 ms
Coil resistance	26600 $\Omega$ $\pm$ 15 % (at 20 °C)
Power dissipation for nominal condition	0.45 W

### Contact side

Contact type	2 PDT
Type of switch contact	Single contact
Contact material	AgNi
Maximum switching voltage	250 V AC/DC
Minimum switching voltage	5 V (at 10 mA)
Min. switching current	10 mA (At 5 V)
Maximum inrush current	25 A (20 ms)
Limiting continuous current	8 A
Interrupting rating (ohmic load) max.	190 W (at 24 V DC)
	85 W (at 48 V DC)
	60 W (at 60 V DC)
	44 W (at 110 V DC)
	60 W (at 220 V DC)
	2000 VA (for 250 V AC)
Switching capacity	2 A (at 24 V, DC13)
	0.2 A (at 250 V, DC13)
	3 A (at 24 V, AC15)
	3 A (at 120 V, AC15)
	3 A (at 250 V, AC15)
Motor load according to UL 508	1/4 HP, 120 V AC
	1/2 HP, 240 V AC

### General

Test voltage relay winding/relay contact	5 kV AC (50 Hz, 1 min.)
Test voltage relay contact/relay contact	2.5 kV AC (50 Hz, 1 min.)
Operating mode	100% operating factor
Mechanical service life	3x 10 <sup>7</sup> cycles

# Single relay - REL-MR-110DC/21-21 - 2961202

## Technical data

### General

Service life, electrical	see diagram
Mounting position	any
Assembly instructions	Can be aligned without spacing (> 70 °C ≥ 2.5 mm)

### Connection data

Connection method	Solder connection
-------------------	-------------------

### Standards and Regulations

Connection in acc. with standard	CUL
Standards/regulations	IEC 60664
	EN 50178
	EN 61810-1
Insulation	Basic insulation
Pollution degree	3
Overvoltage category	III

### Environmental Product Compliance

China RoHS	Environmentally friendly use period: unlimited = EFUP-e
	No hazardous substances above threshold values

## Classifications

### eCl@ss

eCl@ss 5.0	27371601
eCl@ss 5.1	27371600
eCl@ss 6.0	27371600
eCl@ss 7.0	27371601
eCl@ss 8.0	27371601
eCl@ss 9.0	27371601

### ETIM

ETIM 2.0	EC001437
ETIM 3.0	EC001437
ETIM 4.0	EC001437
ETIM 5.0	EC001437
ETIM 6.0	EC001437
ETIM 7.0	EC001437

# Single relay - REL-MR-110DC/21-21 - 2961202

## Classifications

### UNSPSC

UNSPSC 6.01	30211916
UNSPSC 7.0901	39121515
UNSPSC 11	39121515
UNSPSC 12.01	39121515
UNSPSC 13.2	39122334

## Approvals

### Approvals

#### Approvals

UL Recognized / cUL Recognized / PRS / GL / UL Recognized / cUL Recognized / VDE Zeichengenehmigung / EAC / EAC

#### Ex Approvals

### Approval details

UL Recognized		<a href="http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm">http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm</a>	FILE E 228652
---------------	--	---	---------------

cUL Recognized		<a href="http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm">http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm</a>	FILE E 228652
----------------	--	---	---------------

PRS		<a href="http://www.prs.pl/">http://www.prs.pl/</a>	TE/2109/880590/16
-----	--	---	-------------------

GL		<a href="https://approvalfinder.dnvgl.com/">https://approvalfinder.dnvgl.com/</a>	46016-03 HH
----	--	---	-------------

UL Recognized		<a href="http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm">http://database.ul.com/cgi-bin/XYV/template/LISEXT/1FRAME/index.htm</a>	FILE E 228652
---------------	--	---	---------------

# Single relay - REL-MR-110DC/21-21 - 2961202

## Approvals

cUL Recognized		<a href="http://database.ul.com/cgi-bin/XYVV/template/LISEXT/1FRAME/index.htm">http://database.ul.com/cgi-bin/XYVV/template/LISEXT/1FRAME/index.htm</a>	FILE E 228652
----------------	--	---	---------------

VDE Zeichengenehmigung		<a href="http://www2.vde.com/de/Institut/Online-Service/VDE-gepruefteProdukte/Seiten/Online-Suche.aspx">http://www2.vde.com/de/Institut/Online-Service/VDE-gepruefteProdukte/Seiten/Online-Suche.aspx</a>	40007758
------------------------	--	---	----------

EAC			TR_TS_D_00573_c
-----	--	--	-----------------

EAC			TR_TS_S_00010_c
-----	--	--	-----------------

## Accessories

### Additional products

Relay base - PLC-BPT-120UC/21-21 - 2900287



14 mm PLC basic terminal block with push-in connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, 2 PDTs, input voltage 120 V AC/DC

Relay base - PLC-BSP-120UC/21-21 - 2912471



14 mm PLC basic terminal block with spring-cage connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, 2 PDTs, input voltage 120 V AC/DC

## Single relay - REL-MR-110DC/21-21 - 2961202

### Accessories

Relay base - PLC-BSC-120UC/21-21 - 2967031



14 mm PLC basic terminal block with screw connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, 2 PDTs, input voltage 120 V AC/DC

---

Relay base - PLC-BPT-230UC/21-21 - 2900288



14 mm PLC basic terminal block with push-in connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, 2 PDTs, input voltage 230 V AC/DC

---

Relay base - PLC-BSP-230UC/21-21 - 2912484



14 mm PLC basic terminal block with spring-cage connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, 2 PDTs, input voltage 230 V AC/DC

---

Relay base - PLC-BSC-230UC/21-21 - 2967044



14 mm PLC basic terminal block with screw connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, 2 PDTs, input voltage 230 V AC/DC

---

Relay base - PLC-BSC-120UC/21-21/SO46 - 2980416



14 mm PLC basic terminal block with interference current and interference voltage protection on the control side, with screw connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, with integrated RCZ filter, 2 PDTs, input voltage 120 V AC

---

## Single relay - REL-MR-110DC/21-21 - 2961202

### Accessories

#### Relay base - PLC-BSC-230UC/21-21/SO46 - 2980429



14 mm PLC basic terminal block with interference current and interference voltage protection on the control side, with screw connection, without relay or solid-state relay, for mounting on DIN rail NS 35/7,5, with integrated RCZ filter, 2 PDTs, input voltage 230 V AC

---

#### Relay base - PR1-BSC2/2X21 - 2833518



Relay base PR1..., for miniature power relay or miniature switching relay with 1 or 2 PDT or solid-state relay of same construction, 2/2 level design, screw connections, connection facility for input/interference suppression modules

---

#### Relay base - PR1-BSC3/2X21 - 2833521



Relay base PR1..., for miniature power relay or miniature switching relay with 1 or 2 PDT or solid-state relay of same construction, 1/3 level design, screw connections, connection facility for input/interference suppression modules

---

#### Relay base - PR1-BSP3/2X21 - 2833534



Relay base PR1..., for miniature power relay or miniature switching relay with 1 or 2 PDT or solid-state relay of same construction, 1/3 level design, spring-cage connections, connection facility for input/interference suppression modules

---

#### Relay base - RIF-1-BPT/2X21 - 2900931



RIF-1... relay base, for miniature power relay with 1 or 2 PDTs or solid-state relays of the same design, push-in connection, plug-in option for input/suppressor modules, for mounting on NS 35/7,5

## Single relay - REL-MR-110DC/21-21 - 2961202

### Accessories

Relay base - RIF-1-BSC/2X21 - 2900930



RIF-1... relay base, for miniature power relay with 1 or 2 changeover contacts or identical solid-state relays, screw connection, plug-in option for input/interference suppression modules, for mounting on NS 35/7,5